September 26, 2001

Steve P. Janus
Level 3 Communications
1025 Eldorado Blvd.
Broomfield, Colorado 80021

Re: Exempt Construction and Operation Status,
089-14611-00468

Dear Mr. Janus:

The application from Level 3 Communications - Gary, received on July 16, 2001, has been reviewed. Based on the data submitted and the provisions in 326 IAC 2-1.1-3, it has been determined that the following emergency generator, to be located at 901 Adams Street, Gary Indiana, 46402 is classified as exempt from air pollution permit requirements:

(a) One (1) diesel-powered emergency generator rated at 300 kilowatts operating less than 500 hours per year, venting to the atmosphere via stack G-1.

(b) One (1) 1,000 gallon diesel storage tank (GT-1) venting to the atmosphere.

The following conditions shall be applicable:

(1) The diesel powered emergency generator shall not operate more than 500 hours per year.

(2) Pursuant to 326 IAC 5-1-2 (Opacity Limitations) except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following:

(a) Opacity shall not exceed an average of twenty percent (20%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.

(b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of 15 minutes (60 readings) in a 6-hour period as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continous opacity monitor in a six (6) hour period.

(3) Pursuant to 326 IAC 8-9 (Volatile Organic Liquid Storage Vessels), this rule applies to stationary vessels used to store volatile organic liquids (VOL) that are located in specified counties, including Lake County.

Vessels with a capacity less than thirty-nine thousand (39,000) gallons, which would include GT-1 are subject to the reporting and record keeping provisions 6(a) and (b) of this section. This requires maintaining a record and submitting to the department a report containing the following information for each vessel:

(a) Vessel identification number.

(b) Vessel dimensions.

(c) Vessel capacity.

This exemption is the first air approval issued to this source.

An application or notification shall be submitted in accordance with 326 IAC 2 to the Office of Air Quality (OAQ) if the source proposes to construct new emission units, modify existing emission units, or otherwise modify the source.

Sincerely,

Original Signed by Paul Dubenetzky
Paul Dubenetzky, Chief
Permits Branch
Office of Air Quality

ERG/RB

cc: File - Lake County
Lake County Health Department
Air Compliance - Rick Massoels
North West Regional Office
Permit Tracking - Janet Mobley
Technical Support and Modeling - Michele Boner
Compliance Branch - Karen Nowak

Indiana Department of Environmental Management
Office of Air Quality

Technical Support Document (TSD) for an Exemption

Source Background and Description

Source Name:	Level 3 Communications - Gary
Source Location:	901 Adams Street, Gary, Indiana 46402
County:	Lake
SIC Code:	4813
Operation Permit No.:	089-14611-00468
Permit Reviewer:	ERG/RB

The Office of Air Quality (OAQ) has reviewed an application from Level 3 Communications relating to the construction and operation of an emergency generator.

Emission Units and Pollution Control Equipment

The source also consists of the following facilities/units:

(a) One (1) diesel-powered emergency generator rated at 300 kilowatts operating less than 500 hours per year, venting to the atmosphere via stack G-1.

(b) One (1) 1,000 gallon diesel storage tank (GT-1) venting to the atmosphere.

Note: Emissions are at exemption levels.

New Emission Units and Pollution Control Equipment Receiving Prior Approval

There are no new construction activities included in this permit.

Existing Approvals

The source does not have an existing permit - this exemption is the facilities first approval.

Enforcement Issue

There are no enforcement actions pending.

Stack Summary

Stack ID	Operation	Height (feet)	Diameter (inches)	Flow Rate (acfm)	Temperature (^{0}F)
G-1	generator	8	0.5	1526	893

Recommendation

The staff recommends to the Commissioner that the construction and operation be approved. This recommendation is based on the following facts and conditions:

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant.

An application for the purposes of this review was received on July 16, 2001, with additional information received on August 2, 2001.

Emission Calculations

See Appendix A of this document for detailed emissions calculations (4 pages).

Potential To Emit Before Controls

Pursuant to 326 IAC 2-1.1-1(16), Potential to Emit is defined as "the maximum capacity of a stationary source or emissions unit to emit any air pollutant under its physical and operational design. Any physical or operational limitation on the capacity of a source to emit an air pollutant, including air pollution control equipment and restrictions on hours of operation or type or amount of material combusted, stored, or processed shall be treated as part of its design if the limitation is enforceable by the U. S. EPA, the department, or the appropriate local air pollution control agency."

Pollutant	Potential To Emit (tons/year)
PM	0.23
PM-10	0.23
SO_2	0.22
VOC	0.27
CO	0.71
NO_x	3.28

(a) The potential to emit (as defined in 326 IAC 2-7-1(29)) of VOC is less than 15 pounds per day and all other criteria pollutants is less than 25 tons per year. Therefore, the source is not subject to the provisions of 326 IAC 2-7.

(b) The potential to emit (as defined in 326 IAC 2-7-1(29)) of criteria pollutants is less than 25 tons per year. Therefore, the source is not subject to the provisions of 326 IAC 2-6.1.

(c) The potential to emit (as defined in 326 IAC 2-7-1(29)) of pollutants is less than the levels listed in 326 IAC 2-1.1-3(d)(1), therefore, the source is subject to the provisions of 326 IAC 2-1.1-3.

(d) The potential to emit (as defined in 326 IAC 2-7-1(29)) of any single HAP is less than ten (10) tons per year and/or the potential to emit (as defined in 326 IAC 2-7-1(29)) of a combination of HAPs is less than twenty-five (25) tons per year. Therefore, the source is not subject to the provisions of 326 IAC 2-7.

(e) This type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2.

County Attainment Status

The source is located in Lake County.

Pollutant	Status
PM-10	Moderate
SO_2	Primary
Ozone	Severe
CO	Maintenance
Lead	Attainment

(a) Volatile organic compounds (VOC) and oxides of nitrogen (NOx) are precursors for the formation of ozone. Therefore, VOC emissions are considered when evaluating the rule applicability relating to the ozone standards. Lake County has been designated as nonattainment for ozone. Therefore, VOC and NOx emissions were reviewed pursuant to the requirements for Emission Offset, 326 IAC 2-3.

(b) Lake County has been classified as nonattainment for all other criteria pollutants (except lead). Therefore, these emissions were reviewed pursuant to the requirements for Emission Offset, 326 IAC 2-3.

(c) Lake County has been classified as attainment or unclassifiable for lead. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2 and 40 CFR 52.21.

Part 70 Permit Determination

326 IAC 2-7 (Part 70 Permit Program)

This existing source is not subject to the Part 70 Permit requirements because the potential to emit (PTE) of:

(a) each criteria pollutant is less than 25 tons per year,

(b) a single hazardous air pollutant (HAP) is less than 10 tons per year, and

(c) any combination of HAPs is less than 25 tons/year.

Federal Rule Applicability

(a) 326 IAC 12, 40 CFR Part 60, Subpart Kb Standards of Performance for Volatile Organic Liquid Storage Vessels apply to chemical storage tanks with a capacity greater than 40 cubic meters (m^3) and were constructed after July 1984. Level 3 Communications diesel storage tank was constructed in October 2000 but is less than 40 M^3, therefore, it is not subject to the requirements of Subpart Kb.

(b) There are no other New Source Performance Standards (NSPS)(326 IAC 12 and 40 CFR Part 60) applicable to this source.

(c) There are no National Emission Standards for Hazardous Air Pollutants (NESHAPs)(326 IAC 14 and 40 CFR Part 63) applicable to this source.

State Rule Applicability - Entire Source

326 IAC 2-6 (Emission Reporting)

This source is located in Lake County and the potential to emit any criteria pollutant is less than ten (10) tons per year. Therefore, 326 IAC 2-6 does not apply.

326 IAC 5-1 (Visible Emissions Limitations)

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit. Note Gary is the portion of Lake County that requires more stringent Opacity limits:

(a) Opacity shall not exceed an average of twenty percent (20%) any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.

(b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings) as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

State Rule Applicability - Individual Facilities

326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants (HAP))

The operation of emergency generator will emit less than 10 tons per year of a single HAP or 25 tons per year of a combination of HAPs. Therefore, 326 IAC 2-4.1 does not apply.

326 IAC 8-1-6 (New Facilities - General Reduction Requirement)

This source does not have potential VOC emissions equal to or greater than twenty five (25) tons per year, and is subject to 326 IAC 8-4-3, and 326 IAC 8-9, therefore this source is not subject to the provisions of 326 IAC 8-1-6.

326 IAC 8-4-3 (Petroleum Liquid Storage Facility)

This applies to all petroleum liquid storage vessels with capacities greater than one-hundred fifty-thousand (150,000) liters, (39,000 gallons). Level 3 Communications has one (1) 1,000 gallon tank, and therefore is not subject to the provisions of 326 IAC 8-4-3.

326 IAC 8-9 (Volatile Organic Liquid Storage Vessels)

This rule applies to stationary vessels used to store volatile organic liquids (VOL) that are located in specified counties, including Lake County.

Vessels with a capacity less than thirty-nine thousand (39,000) gallons, which would include GT-1 are subject to the reporting and record keeping provisions 6(a) and (b) of this section. This requires maintaining a record and submitting to the department a report containing the following information for each vessel:

(a) Vessel identification number.

(b) Vessel dimensions.

(c) Vessel capacity.

Conclusion

The construction and operation of this emergency generator shall be subject to the conditions of the attached proposed Exemption 089-14611-00468.

Appendix A: Emission Calculations
Internal Combustion Engines - Diesel Fuel
>250 and <600 HP
Reciprocating

Company Name: **Level 3 Communications L.L.C**
Address City IN Zip: **901 Adams Street, Gary, Indiana 46402**
CP#: **089-14611**
Plt ID: **089-00468**
Reviewer: **ERG/RB**
Date: **08/13/2001**

Heat Input Capacity
MM Btu/hr

3.0

	Pollutant					
	PM*	PM10*	SO2	NOx	VOC	CO
Emission Factor in lb/MMBtu	0.31	0.31	0.29	4.41	0.4	0.95
Potential Emission in tons/yr	0.23	0.23	0.22	3.28	0.27	0.71

Methodology

Potential Througput (hp-hr/yr) = hp * 500 hr/yr

Emission Factors are from AP42 (Supplement B 10/96), Table 3.3-2
Emission (tons/yr) = [Heat input rate (MMBtu/hr) x Emission Factor (lb/MMBtu)] * 500 hr/yr / (2,000 lb/ton)
*PM emission factors are assumed to be equivalent to PM10 emission factors. No information was given regarding which method was used to determine the factor or the fraction of PM10 which is condensable.
Note: Check the applicable rules and test methods for PM and PM10 when using the above emission factors to confirm that the correct factor is used (i.e., condensable included/not included).

TANKS 4.0
Emissions Report - Summary Format
Tank Identification and Physical Characteristics

Company:	
Type of Tank:	Vertical Fixed Roof Tank
Description:	

Tank Dimensions

Shell Height (ft):	12.00
Diameter (ft):	4.00
Liquid Height (ft):	11.50
Avg. Liquid Height (ft):	11.50
Volume (gallons):	1,113.94
Turnovers:	4.00
Net Throughput (gal/yr):	4,455.76
Is Tank Heated (y/n):	Y

Paint Characteristics

Shell Color/Shade:	White/White
Shell Condition:	Good
Roof Color/Shade:	White/White
Roof Condition:	Good

Roof Characteristics

Type:	Cone
Height (ft):	1.50
Slope (ft/ft) (Cone Roof):	0.75

Breather Vent Settings

Vacuum Settings (psig):	0.00
Pressure Settings (psig):	0.00

Meteorological Data used in Emissions Calculations: Indianapolis, Indiana (Avg Atmospheric Pressure = 14.33 psia)

TANKS 4.0
Emissions Report - Summary Format
Liquid Contents of Storage Tank

Mixture/Component	Month	Daily Liquid Surf. Temperatures (deg F) Avg.	Min.	Max.	Liquid Bulk Temp. (deg F)	Vapor Pressures (psia) Avg.	Min.	Max.	Vapor Mol. Weight	Liquid Mass Fract.	Vapor Mass Fract.	Mol. Weight	Basis for Vapor Pressure Calculations
Distillate fuel oil no. 2	All	0.00	0.00	0.00	0.00	0.0031	0.0031	0.0031	130.0000			188.00	Option 1: VP40 = .0031

TANKS 4.0
Emissions Report - Summary Format
Individual Tank Emission Totals

Annual Emissions Report

	Losses(lbs)		
Components	Working Loss	Breathing Loss	Total Emissions
Distillate fuel oil no. 2	0.04	0.00	0.04